Conclusions

When approaching the economic analysis of technical trade barriers, a set of questions arises. The most fundamental refers to the nature of the barrier. Is it related to plant and animal health, food safety, or conservation? The answer will give a preliminary indication of the relevant economic model to use for analysis, although since many regulations have multiple objectives, the appropriate model may combine elements from those described earlier.

The second broad question is to ask what policy instruments are used. Does the importer establish product standards (together with conformity assessment requirements), or are there geographical restrictions on the source of the product? Are there special labeling, package dimension or production method requirements? The translation of such instruments into variables, equations, and constraints in economic models requires imagination and experimentation. But all policy instruments have some measurable effect on markets, through their cost of compliance or their restriction on prices or quantities. Any analysis that fails to account for such costs and impacts is crucially incomplete.

The next set of questions involves the effect of the implementation (or non-implementation) of the regulation on market behavior. This effect is different from the effect on the market of the instrument used. The essence of a technical trade barrier is that it potentially changes the conditions of supply or demand (or both) as well as imposing a direct compliance cost. In the example discussed above, the effect of allowing potentially pest-infested avocados into the United States is quite clearly different from the cost of a ban on Mexican avocados.32 What would happen to domestic supply if the regulation were not in force? Would the domestic supply curve be shifted by the importation of unregulated goods? What would this do to domestic costs? How could the infestation be controlled, and at what expense? A wealth of technical information is needed to estimate such effects and put them in a form usable for an

economic model. But without such estimates, however crude, there is no way to judge whether the regulation is justified, whether it has trade implications, and whether there are better (and less trade-distorting) ways to achieve the same level of protection for plant, animal, or human health.

The same question needs to be asked with respect to the impact on consumption. Are there implications for consumer behavior of regulations on imports? Would consumers lose confidence if the product were not held to specific standards? Would consumers be able to recognize qualities of products without the help of regulations? What is the net effect of the regulations on the consumer demand curve? Addressing these questions entails estimation that may be even more difficult than for supply-shifting regulations. We know little about how consumers react to information, and hence to regulations that require labeling and origin specification. But if regulations are to be defended on their ability to inform the consumer, and if these regulations treat domestic and foreign products differently, there is little alternative to attempting such analysis.

Another issue is the relative position of particular exporters and importers in the marketplace. Are the regulations common to all importers, implying that there is no unregulated market available to exporters? Do the regulations apply to all exporters or is there differentiation by source? Knowledge of the regulations of all countries would be ideal, but, in practice, some indication of the behavior of competitors is needed to be able to estimate the incidence of the burden of complying with regulations.

Finally, it is worth considering the structure of the market in which the goods are sold. Does either the importer or the exporter have any market power? Is the market characterized by competition or could dominant players influence the world price through their action? This requires some indication of the nature of the world market for the commodity in question, in order to impute the terms-of-trade effect of the regulations under study.

These and similar questions define the challenges facing those who seek to bring economic analysis to

³² To put it another way, both the opportunity cost and the monetary cost of the regulation are needed.

bear on policy decisions about technical trade barriers. This report provides an initial framework in which to place such an inquiry. The suggested classification scheme sets up the economic analysis. The analysis prompts the researcher for answers to particular questions. The questions, as often as not, will serve to demonstrate how little information we have in a systematic and usable form to address these issues. Case studies are needed, as others have recognized. But case studies are more useful if framed in a classification system such as we have proposed. And these case studies in turn can become examples of various types of economic models such as those discussed above, and can be built on by others.

We have not dealt with the issue of the political economy of such trade barriers, nor with the ways in which international regulations can be improved to prevent tensions in the world (and regional) trade system. But the classification and quantification of technical barriers is a necessary first step in any further analysis. Policy issues with respect to these barriers will be increasingly important in the future. The benefits of sound economic analysis of current technical trade barriers and the consideration of pertinent policy options will therefore increase as well.